

REMARKS

The present Amendment and Response is intended to be fully responsive to all points of objection and/or rejection raised by the Examiner and is believed to place the application in condition for allowance. Applicants assert that the present invention is new, non-obvious and useful. Prompt reconsideration and allowance of the claims are respectfully requested.

Status of the Claims

Claims 1-6 are pending in the application.

Claims 1-6 have been amended without prejudice. Claim 7 has been cancelled.

Remarks to Claim Objections

The Office Action objected claims 1-7 for informalities and the use of trademark or trade name. Applicants have amended claims 1-6 to remove the figure elements, and have voluntarily cancelled claim 7.

In view of above amendment, Applicants respectfully request above objections of claims 1-7 be withdrawn.

Remarks to Claim Rejections

Claim Rejections - 35 USC §112

The Office Action rejected claims 1-7 under 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicants regard as the invention.

Applicants have amended claims 1-7 to address the above rejections. In particular, Applicants have changed claim 3 to read as “said N storage fields” instead of “said N fields”; amended claim 1 to remove phrases like “e.g.”, “i.e.”, and paraphrased the claim to define the phrase “in parallel” more clearly; and changed claim 5 to read as “enables said writing” instead of “enable said”. Applicants assert that the above amendments are fully supported by the specification of record and add no new matters.

In view of above, Applicants respectfully request rejections of claims 1-7 under 35 U.S.C. §112, second paragraph, be withdrawn.

Claim Rejections - 35 USC §103

The Office Action rejected claims 1-7 under 35 U.S.C. §103(a), as being unpatentable over Gilliland et al. (US 4,229,790). Applicants respectfully disagree.

According to MPEP 2142, in order to establish a *prima facie* case of obviousness, the prior art reference (or references when combined) must teach or suggest all the claim limitations. Applicants assert that Gilliland, in combination with allegedly “old and well known art”, fails to reach the threshold as set forth by MPEP 2142 in order to establish a *prima facie* case of obviousness against claim 1 as being discussed below in more details.

In rejecting independent claim 1, the Office Action alleges that Gilliland teaches, at col. 5, lines 4-8, PSWs that indicate active status for tasks. However, prior art Gilliland does not teach, suggest, or imply a means (a first logic means) for enabling the tasks and for inhibiting others, as specifically required by claim 1. PSW, which stands for process-status-word according to Gilliland, is an indicator of process status. Col. 5, lines 4-8, as quoted by the Office Action, describes grouping the PSWs by placing the PSW pointers in a FIFO buffer, but failed to teach how PSWs enable tasks, particularly valid tasks; and failed to teach the logic means, as specifically recited by claim 1, being presented on a dedicated bus. This lack of above description by prior art Gilliland is understandable since PSW is a “word”, and not a means, and therefore is incapable of enabling tasks, or valid tasks as specifically required by claim 1 of the present invention.

In rejecting claim 1, the Office Action also alleges that Gilliland teaches, at col. 5, lines 9-10, entries in the FIFOs being address locations of the PSWs. However, prior art Gilliland does not teach, suggest, or even imply a task management circuit. In particular, Col. 5, lines 9-10, as quoted by the Office Action, failed to teach a task management circuit that is coupled to the logic means; has a FIFO memory connected to the dedicated bus; and is configured to store valid tasks being presented to all of its storage fields in parallel on the dedicated bus, all of above distinctive features are specifically required by claim 1 of the present invention.

The Office Action admits that Gilliland does not teach a second logic means that inhibits the writing of a task in the field (s) of the FIFO memory where a valid task has been entered and enable the writing in the first free field below the pile. In the meantime, the Office Action contends that the above features, as specifically required by claim 1 of the present invention, are old and well known in the art but failed to provide any factual support.

Without conceding appropriateness of the above contention made by the Office Action, in view of the lack of factual support, Applicants respectfully submit that in view of all the deficiencies as discussed above with regard to other distinctive features and elements, claim 1 of the present invention is patentable over prior art Gilliland.

Claims 2-6 depend from claim 1 and thus include all the distinguishing elements of claim 1, as described above, as well as other distinct features and elements. Claims 2-6 are patentable for at least the same reasons as discussed above with regard to claim 1.

Claim 7 has been cancelled without prejudice.

In view of above, Applicants respectfully request rejections of claims 1-7 under 35 U.S.C. §103(a) be withdrawn.

Conclusion

In view of the preceding remarks, Applicants respectfully submit that all pending claims are now in condition for allowance. Favorable reconsideration and allowance of the claims are respectfully requested.

No fees are believed to be due in connection with this paper. However, if there is any such fee due, please charge any such fee to the deposit account No. 09-0458.

Respectfully submitted,

/Yuanmin Cai/

Yuanmin Cai
Agent for Applicants
Registration No. 56,513

Dated: October 10, 2007

INTERNATIONAL BUSINESS MACHINES CORPORATION

Intellectual Property Law Department, East Fishkill
2070 Route 52, Bldg-321, Zip-482
Hopewell Junction, NY 12533
Tel: (845) 894-8469
Fax: (845) 892-6363